

DUAL-LAYER COMPLIANT POLYMERIC NOZZLE

Abstract

An integrated circuit screen printing nozzle that has a nozzle body, a first inner layer on the nozzle body, a second outer layer on the first layer, and an opening through the nozzle body, the first layer, and the second layer. The first and second layers can be an insert held within the body. The opening allows paste material to flow through the screen printing nozzle to the stencil mask. Also, the second outer layer includes a contact surface adapted to contact the stencil mask. One feature of the invention is that the first layer is softer (has a lower durometer) than the second layer. This allows the second layer to be more durable than the first layer and for the first layer to provide additional flexibility to the second layer. Therefore, the invention provides a nozzle that has the high durability characteristics of a hard outer surface with the compliance of a soft nozzle.